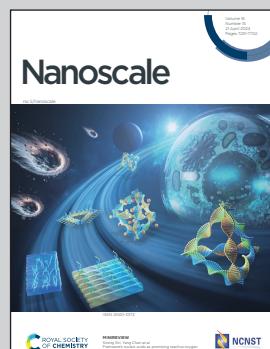


Showcasing research from Professor Kickelbick's laboratory, Inorganic Chemistry, Saarland University, Saarbrücken, Germany.

Amphiphilic titania Janus nanoparticles containing ionic groups prepared in oil-water Pickering emulsion

Amphiphilic TiO_2 Janus particles carrying both stable cationic and non-polar functional groups on their opposite hemispheres were prepared in a one-step process by Pickering emulsions using phosphonic acids as modifying agents. Their amphiphilic nature allows these particles to be used for improved stabilization of Pickering emulsions. Furthermore, the particles exhibit exceptional self-assembly behaviour and are suitable for the controlled modification of the wettability of substrates by a simple dip-coating process.

As featured in:



See Lucas Niedner and Guido Kickelbick, *Nanoscale*, 2024, **16**, 7396.